Economic Well-Being from Steve Hank's Point of View / Iraq as a Model for the Period (2004-2020)

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Abstract

The research seeks to analyze the indicators of approaching economic prosperity in Iraq for the period (2004-2020), from the point of view of economist Steve Hanke from the American Johns Hopkins University, which includes the targets of monetary and financial policies: growth in real per capita output, and inflation and unemployment equations—the nominal interest (or policy rate). The inductive approach - descriptive Analysis was adopted in the research method using Iraqi data from the Ministry of Planning and the Central Bank. The research results were the continued dependence of the most significant proportion of actual per capita output growth on fluctuations in global crude oil markets and the high performance of monetary policy in reducing inflationary pressures through its non-existent tools. Direct and with the cheerful help of net foreign assets and closing the merchandise deficit from imports, the focus of fiscal policy on reducing the disparity in income distribution by increasing the employment of the unemployed in the government sector and deepening disguised unemployment, the link between the effectiveness of monetary and fiscal policies in achieving economic well-being with the unsustainability of growth in real per capita output and the relative rise In the unemployment rate, they are two aspects of the distortion of the structure of the Iraqi economy. The study concluded that it is critical to concentrate macroeconomic policy, particularly its monetary and financial tools, on diversifying the Iraqi economy to maintain the rise in real income for each and distributive justice for employment. This is also necessary to sustain economic well-being, the central bank's independence, and its ability to respond to the market by balancing the need to rein in inflation with the promotion of investment and reorganizing the commercial banking sector to boost and expand the economy of Iraq.

Keywords: *fiscal policy, monetary policy, Steve Hank, economic well-being.*

The Introduction

The goal of any development process is to increase individual real output growth to achieve economic well-being, as long as this growth affects those with low incomes at the expense of those with high incomes and allows both the individual and the group to feel satisfied and happy from gradually consuming a variety of goods and services. The mechanism for exploiting available economic resources and achieving economic well-being is represented by the tools and tasks of macroeconomic policy, primarily monetary and financial policy, through its goals of stabilizing the general level of prices, improving the factors that attract investment and reducing repulsive factors, increasing the use of the labour force to reduce unemployment, and growing individual actual output as an indicator of growth and well-being. Steve Hanke addressed these four targets in determining the overall index of the degree of economic well-being by subtracting the growth of

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actual per capita output from the economic and social costs of economic activity (inflation, unemployment, and nominal interest rates), whereas the degree increases, the effectiveness of monetary and financial policies in achieving for economic well-being, and vice versa.

The monetary and financial policies implemented in Iraq between 2004 and 2020 faced obstacles to attaining economic well-being due to state rentiers, uneven security situation stability, and the focus of monetary policy on containing inflation. This challenge was reflected in the growth of individual actual output and the equitable distribution of real output among society members. While both policies are characterized by a lack of vigour in promoting investment in real production sectors and the economic efficiency of public spending, respectively, the fiscal policy focuses on distributive justice for job prospects.

Significance of the Study

The significance of the research stems from the role that Iraq's financial and monetary policy decisions and actions have played in attaining economic well-being, which is the most crucial precondition for economic development.

Problem Statement

The extent to which monetary and financial macroeconomic policy tools affect both aspects of economic well-being, expanding the growth of individual actual output, equitably distributing real output among society's members, and the state's efforts to address the detrimental effects on the economy and culture resulting from the mismanagement of oil resources, as well as the long-term effects, constitute the research problem. Both directly and indirectly in terms of financial prosperity.

Research Objective

The goal of the study is to shed light on the actual state of four sub-indicators of economic well-being in Iraq between 2004 and 2020: growth in actual per capita output, inflation, unemployment, and official interest rates; additionally, an overall indicator of the efficiency of monetary and financial policies in achieving Steve Hank's economic well-being is included.

Research Hypothesis

The study's premise is that Iraq's fiscal and monetary policies have successfully promoted economic growth, distributive fairness, and individual real production growth throughout 2004–2020.

Research Structure

The research was split into two sections in addition to the conclusions and recommendations in order to test the research hypothesis and adhere to its objectives. The conceptual and theoretical underpinnings were covered in the first portion, and the development of Steve Hank's metrics for achieving economic prosperity in Iraq during the 2004–2020 timeframe was covered in the second.

The First Section: Conceptual and Theoretical Qualification

First: What is Economic Well-Being?

Welfare is a component of social well-being that benefits the individual and the group by meeting their fundamental requirements for housing, food, clothes, healthcare, and education (Al-Shammari & Al-Talqani, 2018, pp. 75–76). This aligns with the Human Development Index

(HDI) published by the United Nations, which emphasizes the value of raising living, educational, and health standards for individuals and society (United Nations, 2015, p. 3). It also suggests that achieving the highest life satisfaction correlates with economic well-being. Goods and services by making the best use of the available financial resources (Al-Ugaili, 2001, p. 270). The mechanism for achieving economic well-being is represented by a set of decisions and measures for macroeconomic policy, primarily monetary and financial ones, which the state takes in the short and long terms to increase indicators of economic well-being and positively impact them. On other indicators of social well-being.

According to Hussein (2010), 40, another definition of economic well-being is the advantage and contentment that permits and aids the person to feel fulfilled, contented, and purchasing goods and services due to his varied and growing desires. According to French economist Pigou, the social well-being that the scale measures includes economic well-being. The size of national income, with the caveat that an increase affects those with low incomes at the expense of those with high incomes (Haji, 2014, 250), is the theoretical basis of the methods for measuring the level of well-being. Direct or indirect monetary income (Al-Ugaili, 2001, p. 27). In this regard, he presented two indicators.

Economic, including Pareto's Criterion of optimization, which indicates that reaching economic well-being is achieved by increasing the current income of the individual and that income growth exceeds population growth (Mohamed Youssef, 2019, p. 30), and the increase in actual output per capita can also be used As a measure of economic well-being and under the restriction of the Pareto comparison between output growth and population growth (Hassoun, 2014, p. 22), the approach to financial well-being is also evident from the value of the Gini Coefficient of distributive justice, as society approaches well-being with the Gini coefficient approaching zero (perfect justice).), and it distances itself from well-being with the Gini coefficient approaching a true one (perfect inequality) (Ahmed, 2010, p. 289), while the Criterion of kakwani measure explains the level of economic well-being from its relationship to the individual's current income and distributive justice (Gini coefficient), It becomes more responsive to changes in individual income or expenditure at low values, and less responsive at high values of the Gini coefficient (Rifai, 2023, p. 11).

Achieving social well-being, including economic well-being, represents the primary goal of sustainable development, and the reason relates to the main areas on which sustainable development is based, which are (Al-Hassan, 2011, p. 7) achieving economic growth and distributive justice in the long term, achieving social development through creating job and care opportunities. Health, in addition to preserving environmental and natural resources for future generations, makes the state's performance in achieving well-being depend on evaluating its goals: economic efficiency in using financial resources, performing accurate rates of economic growth, distributive justice of income, provision of educational and health services, and a high level of use of the labour force.

These goals are crucial for macroeconomic policy, particularly monetary and financial policies in the nation under study, in addition to the general level of price stability. Welfare economics is concerned with analyzing and assessing the effectiveness of the systems that allocate resources to maximize social benefit and creating the framework necessary for policies promoting well-being (Hussain, 2010, p. 40).

Some monetary and fiscal policy targets have been employed in determining the Economic Misery Index. For a given society, it contrasts economic well-being, as approaching or moving

away from economic well-being depends on the decrease or increase in economic misery, respectively. In the 1960s, Arthur Akun defined economic misery as a high rate of inflation and unemployment about an economic phenomenon known as stagflation, as it is accompanied by a continuous rise in the general level of prices with increasing unemployment and low levels of national output and growth rates over a certain period. While Robert Barro, in 1991, defined economic misery as a decline in real output growth compared to the sum of official inflation, unemployment, and interest rates, and in 2011, Steve Hanke defined the term economic misery as a rise in the sum of inflation, unemployment, and interest rates. Nominal compared to the growth of actual output per capita (see: Al-Sharaa and Salman, 2022, 260).

According to Steve Hank, the rise in actual output per capita—a measure of the growth in each person's standard of living, which is a prerequisite for well-being—and the fall in the social and economic costs associated with the nation's economic activity—both contribute to the effectiveness of monetary and fiscal policies in achieving economic well-being as an overall indicator. Due to their effects on aggregate demand, output, and use, as well as the distributive justice of living among society's members, these costs are estimated at inflation, unemployment, and nominal interest rates.

Second - The Relationship of Steve Hank's Indicators to Economic Well-Being

The Relationship between Each of Steve Hank's Four Sub-Indices and Financial Well-Being Can be Discussed as Follows

1- Growth of Actual Output Per Capita and Financial Well-Being

Economic growth is defined as the increase in the total added values achieved in the financial sectors within the country's geographical borders with the contribution of national and non-national factors of production (Al-Hasnawi, 2014, p. 190). The goal is a continuous increase in actual output per capita as an indicator of economic growth and well-being, and this requires the use of financial resources in a manner that Effectively arises from reducing the production gap by bringing the actual real output closer to the real potential output, reaching the production capacity to the limits of production potential, and then increasing the population's standard of living. In theory, real output growth at a rate greater than population growth is essential for raising economic well-being. However, it is not sufficient to explain the disparity in the distribution of actual output among the population, as the increase may go to those with high incomes at the expense of those with low incomes, and this is a thorny issue related to the nature of Economic and political systems in state administration, outputs of commodity and service activity.

In addition to other issues related to using growth in actual output per capita as a measure of the quality of life for the population, actual output focuses on the quantity of goods and services produced within the state's borders. It does not consider the quality of those goods and services, whether they are consumer, productive, rentier, or weapons. However, no economic indicator is widely accepted beyond individual actual output (Al-Quraishi, 2010, pp. 73–74).

2- Inflation Rate and Economic Well-Being

Inflation is defined as a monetary phenomenon as an increase in the quantity of money in circulation that leads to a continuous rise in the general level of prices over time and as a price phenomenon as a constant rise in the general level of prices as a result of excess demand compared to the supply of goods and services during a specific period (Al-Roubi,

2009, p. 15). Inflation is measured in terms of well-being by the annual rate of change in the consumer price index (CPI). In theory, the well-being of an individual is affected by the rise in the prices of all goods and services, not some of them. The effect is represented by a decrease in the purchasing power of the monetary unit at the same rate of increase, and the effect becomes apparent when the inflation rate increases over time. To more than 4% in most cases (Al-Saadi, 2015, p. 15).

A more significant portion of society, represented by those with limited incomes and pensions and a high marginal propensity to consume, see a sharp decline in real incomes due to inflationary pressures, while a smaller group of people who are wealthy and producers benefit from investing their savings. This widening of disparities in living standards is another effect of inflationary pressures in successful initiatives where there is a greater demand than supply for their goods.

3- Unemployment Rate and Economic Well-Being

Unemployment, as an economic phenomenon, is represented by the failure of individuals of working age (15-65 years) to engage in economic activity during a specific period for economic reasons beyond their control, despite the availability of the physical and mental ability to work, as well as the desire and search for it (Al-Azzawi, 2015, p. 23), and this is very consistent with the International Labor Organization (ILO) definition of the unemployed as anyone able, willing, and searching for work, and accepts the prevailing wage but to no avail, and the lack of feasibility means the failure of the macroeconomic policy to absorb the unemployed through... Expanding investments horizontally and vertically, getting close to full employment and maintaining an acceptable percentage (unemployment rate) for the unemployed from the economically active category of the population between (3% and 6%) (Al-Afandi, 2014, p. 509).

The high unemployment rate leads to a decline in economic well-being in two aspects. The first is the continuous decline over time in the macroeconomic variables, which are the income level and aggregate demand, and then the actual domestic product with growth rates that exceed the high unemployment growth, per Okun's law (Akun Low). This stipulates that the development of substantial real output increases by 3% as a result of a decrease in the unemployment rate by 1%, and vice versa (Hassoun, 2018, p. 40), and thus the constantly rising unemployment rate contributes to a decline in the population's standard of living over time.

The second aspect can be seen in the rise in the number of people living below the poverty line and the resulting widening of the gap in the standard of living across society. This is because economically active people are losing out on essential opportunities to earn cash due to the ongoing rise in unemployment.

4- The Official Interest Rate and Economic Well-Being

The nominal interest rate is the guiding or reference rate that the Central Bank sets for commercial banks when they accept deposits and grant loans (Wahiba, 2015, p. 88), meaning it is a guide rate for debit interest rates (deposits of all kinds) and credit interest rates (lending of all types). In theory, a rise in the nominal interest rate leads to curbing borrowing due to the inverse relationship between the interest rate and the demand for loans (investment), thus reducing the volume of cash liquidity in the market and reducing the expected inflation rate, and this allows the real interest rate (nominal interest rate -

interest rate) to come closer. Expected inflation) with the nominal price, and achieving actual returns for savers, which prompts them to shift from investing their money in non-productive sectors (speculation) to sectors of the real economy to benefit from the rise in the real interest rate and increase economic growth, but on the condition that the supply of money determines the market interest rate. (saving) Moreover, demand for it (investment) by aligning consumption and investment spending (Ben Azza, 2020, p. 111) means liberalizing the market interest rate.

Using the nominal interest rate as a sub-indicator in the Steve Hank relationship relates to two aspects. The first is that the low-interest rate results from two contradictory effects on the individual's standard of living, as a rise in the interest rate leads to a loss of the expected investment return from curbing borrowing and sacrificing an additional part of the current GDP growth. In exchange for a decrease in inflationary pressures if actual inflation is greater than the targeted inflation. As for the second aspect, reducing investments directed towards actual economic activity reduces job opportunities, increases the unemployment rate, and negatively affects the distributive justice of income.

The second section - the development of Steve Hank's indicators for achieving economic prosperity in Iraq for the period (2004-2020)

First - The Development of the Actual Output Growth Index Per Capita In Iraq

In generating gross domestic product, Iraq relies mainly on financial revenues from the sale of crude oil, as the percentage of contribution of the crude oil, agriculture, and manufacturing sectors to the current GDP as an annual average, according to data from the Ministry of Planning for the period (2004-2020), was approximately 47.5% and 4.7%. 2.03%, respectively, which is reflected in the high degree of imbalance in the structure of production and the structure of exports in all imbalance indicators, including the Friedman-Hirschman (H-H) index, as it equals one in the case of complete imbalance and zero in the case of total diversification, and according to it, the two degrees of occupation reached, respectively, and as an annual arithmetic average. For the period (2004-2019), it is about 0.95 and 0.88 (Al-Taie, 2021, p. 56), and this indicates the loss of the opportunity to increase the added value from converting primary production outputs into different products through the manufacturing industry and the continued dependency of the Iraqi economy on the fluctuations of global markets for crude oil.

Table 1 shows that, as a result of both increased global crude oil prices and Iraq's openness to the outside world, the country's gross domestic product grew from approximately 29.6 trillion dinars in 2003 to 156 trillion dinars in 2008 at varying rates, with the highest increase occurring in 2004 at 79.94%. Conversely, the current output saw a negative yearly growth rate of -16.24% and fell to 130.6 trillion dinars in 2009.

This is attributed to the repercussions of the global financial crisis on crude oil prices, which fell to 60.5 dollars a barrel. At the same time, the years (2010-2013) witnessed the return of the current output to rise to about 162.1 in 2010 and then to 273.6 trillion dinars in 2013, with varying favourable rates, the highest of which was 34.1% in 2011. The reason is the improvement in the demand of consuming countries, which contributed to the rise in Oil prices from about 76.8 to 103.6 dollars per barrel in 2010 and 2013, respectively. Daily oil exports increased from 1.89 to 2.39 million barrels respectively. In 2014 and 2015, the current output declined with negative growth rates.

Table (1): Development of GDP At Current Prices and its Growth Rate, Growth of GDP at Constant Prices, Actual Output Per Capita and Growth Rate (100 = 2007).

year	GDP at current prices, one trillion dinars (1)	Growth rate MΔMh (%) at current prices (2)	Output growth rate MΔMh (%) at current prices (3)	Actual output per capita is one thousand dinars (4)	Growth rate of real output per capita (5)
2003	29.9			2518.4	
2004	53.2	79.94	53.53	3752.7	49.1
2005	73.5	38.13	1.69	3703.8	(1.3)
2006	95.6	29.99	5.6	3796.2	2.49
2007	111.5	16.6	1.91	3755.0	(1.09)
2008	156	39.95	8.23	3782.0	0.72
2009	130.6	(16.24)	3.38	3938.3	4.13
2010	162.1	24.05	6.4	4083.9	3.69
2011	217.3	34.1	7.54	4280.3	4.81
2012	254.2	16.98	13.94	4752.9	11.04
2013	273.6	7.62	7.63	4986.0	4.91
2014	266.3	(2.65)	(3.1)	4709.3	(5.55)
2015	194.7	(26.9)	8.29	5214.6	10.73
2016	196.9	1.15	8.67	5516.7	5.79
2017	221.7	12.56	0.77	5413.7	(1.67)
2018	268.9	21.32	4.71	5522.3	2.01
2019	263	(2.23)	6.9	5752.0	4.16
2020	198.8	(24.4)	(15.84)	4717.3	17.99

D, between parentheses, are negative values

Source: (1) Central Bureau of Statistics and Information Technology, Directorate of National Accounts, Statistical Totals for Bonds (2003-2020), Baghdad: Ministry of Planning.

(2, 3, 4, 5) calculated by researchers based on data from the Ministry of Planning.

-% and -26.9%, respectively, and the reason is ISIS's control over a large area that includes an integral part of projects in the sectors of crude oil, manufacturing, and agriculture on the one hand, and the decline in oil prices to 94.5 in 2014 and then to $47.9 per barrel in 2015 on the other hand, while The years (2016-2018) witnessed a decline, reaching 1.2% and 12.6% for the years 2016 and 2017 due to the rise in daily oil exports to more than 3.5 million barrels, then rising to $68.6 in 2018, which contributed to the increase in current output at a growth rate of 21.3%. The current production soon declined at negative growth rates of -2.2% and -24.5% in 2019 and 2020, respectively, as a result of the repercussions of the Coronavirus pandemic and the lockdown policy in the world (see: Al-Baghlani, 2023, 84-86).

As shown in Table (1), the repercussions of the rentier economy of the Iraqi economy, after excluding fluctuations in inflation rates, on the performance of the GDP growth index at constant prices (2007 = 100) in Iraq for the period (2004-2020), as real national product growth fluctuated between -15.8 % in 2020 and 53.5% in 2004. The fluctuation is a modest improvement in economic performance as long as it is linked to fluctuations in oil revenues, as they are subject to external factors related to demand and supply factors for crude oil in global markets. The fluctuation in actual output is reflected in the growth of real output per capita, as it ranged between -18% in 2020 and 49% in 2004, despite the rise of the actual production per capita from about 3752.7 to 4717.3 thousand dinars for the period (2004 - 2020), which indicates an improvement. It is relative to the average per capita living, especially compared to 2003 when it amounted to 2518.4 thousand dinars. However, it is not sustainable, with the most significant percentage of per capita living being generated from oil revenues, and this is a result of the state's failure to exploit oil revenues to stimulate production capacity in commodity sectors other than oil for internal and external reasons.

Second - The Development of the Inflation Rate Index in Iraq

The variation in inflation rates in Iraq for the period (2004-2020) is affected by the effectiveness of monetary and financial policy in confronting the imbalance in the production structure and reliance on imports to fill the shortage in commodity supply, which is a natural result of the low contribution of commodity sectors other than the oil sector in generating gross domestic product, in addition to the fact that The components of the Iraqi consumer basket are imported par excellence at a rate between (70% and 80%) (Al-Abadi, 2020, p. 85), and by extrapolating the development of the inflation rate from Table (2), it is observed for the period (2004-2012), that the inflation rate increased from 29.9% in 2004 to 39.9% in 2005 and then to 53.2% in 2006.

The primary cause is primarily ascribed to the increase in petroleum derivative prices, which saw a slow downturn in the years that followed, eventually reaching 2.5% in 2010 due to the accessibility of petroleum derivatives, their low cost, and the lack of customs taxes impacting the price of imported goods. Furthermore, the value of the Iraqi dinar increased from 1,467 in 2006 to 1,170 dinars per dollar in 2010, and the increase in residential rent combined with rising import inflation caused the inflation rate to rise from 39% in 2010 to 5.6% in 2011 and 6.1% in 2012 (Dahim, 2023, p. 10).

In general, the inflationary pressures for the period (2004-2012) are due to a group of factors, including an increase in the overall demand for goods and services due to deprivation in the years preceding 2003. In conjunction with the rise in salaries and wages, the lack of a flexible production system capable of meeting consumer demand led to an increase in imports to fill the deficit in commodity supply, in addition to the slow response of monetary and financial policies to reduce inflation.

Compared to the period (2004-2012), the average inflation rate over 2013-2020 was lower, reaching 1% and 20.7%, respectively. This results from the interplay of regional and global variables, such as the ability of monetary policy to effectively target inflationary pressures. The availability of foreign money required for imports through the central bank's currency selling window, the policy rate and stability of the Iraqi dinar's exchange rate, and the decline in import inflation reached an average of 24.3% (Dahim, 2023, p. 10).

Table (2): Evolution of the Inflation Rate and Monetary Stability Factor in Iraq for the Period (2004-2020))2007 =100(.

the year	Inflation rate (%) (1)	Real output growth rate (2	Growth rate of expanded money supply (%) (3)	Monetary stability factor (2) ÷ (3) = (4)
2004	29.9	53.3	185.89	3.47
2005	36.9	1.69	12.32	7.29
2006	53.2	5.60	35.62	6.36
2007	30.8	1.91	40.50	21.20
2008	12.7	8.33	29.78	3.60
2009	8.3	3.38	32.32	9.56
2010	2.5	6.40	38.72	6.05
2011	5.6	7.54	20.20	2.68
2012	6.1	13.94	4.15	0.30
2013	1.9	7.63	13.97	1.83
2014	2.2	(3.10)	(0.7)	0.22
2015	1.4	8.29	(8.99)	1.08
2016	1.2	8.67	13.31	1.54
2017	0.4	0.77	1.91	2.52
2018	0.2	4.41	1.09	0.25
2019	(0.2)	6.90	11.49	1.67
2020	0.8	(15.84)	19.11	(1.21)

() between parentheses are negative values
Source: (1) General Directorate of Statistics and Research, Statistical Bulletin for the Years (2004-2020), Baghdad: Central Bank of Iraq.

(2) From Table (1)

(3) Sakna Jahiya Faraj, (2022), Internal and external balance policies and their effectiveness in the Iraqi economy for the period (2004-2020), doctoral thesis, submitted to the University of Basra: College of Administration and Economics.

(4) From the calculations of the researchers.

The monetary stability factor, which explains the existence of inflationary pressures when the growth rate of the money supply rises compared to the growth of actual output, which pushes prices to a continuous rise, can shed light on the reality of the gap between aggregate demand and supply in the Iraqi economy for the period (2004-2020). When the monetary current is smaller than the commodity current, the reverse happens, which aligns with the economic school's theories regarding the degree of inflation and the efficacy of financial and monetary measures in containing it.

It is noted from Table (2) that the growth rate of money supply in Iraq is higher compared to the growth rate of actual output for the period (2004-2020) except for the years 2012, 2014 and 2018 for various reasons, the most important of which are the selling prices of crude oil, net foreign assets, and the demand for money. This indicates the presence of...

Throughout the research period, inflationary pressures existed, albeit to differing degrees. They were concentrated in the 2004–2011 time frame, with 2011 and 2007 having values of 2.68 and 21.2, respectively. The average monetary stability factor for the two decades was 753 and 0.67, respectively. They declined somewhat throughout the period (2012-2020), ranging between 1.21 and 2.52 for 2020 and 2017, respectively.

Inflationary pressures in Iraq would become severe due to the rise in the monetary flow compared to the commodity flow were it not for the effectiveness of economic and financial macroeconomic policy measures due to the abundance of foreign financial revenues from the sale of crude oil and their use to fill The deficit in the supply of goods from imports, and fixing the exchange rate of the Iraqi dinar against the dollar.

Third: The Development of the Unemployment Rate Index in Iraq

The width of the gap between labour supply and demand (apparent unemployment) in Iraq after 2003 depends on the interaction of several factors, the most important of which are:

1- An increase in the number of entrants into the labour market as a result of the high population growth of 3% as a compound rate for the period (2004-2020), according to data from the Ministry of Planning and Expatriate Foreign Workers, especially after companies entered the oil licensing rounds to work in Iraq.
2- The negatives of the rentier state in limiting the economy's ability to deal with its crises, of which unemployment is one of them due to the oil sector absorbing a tiny percentage of the labour force, and therefore, job opportunities cannot be created except by diversifying the Iraqi economy,
3- The weakness of the private sector in creating job opportunities is due to its low contribution to the gross domestic product and its dominance by individual and small companies.
4- Expanding the employment of surplus labour force in the government sector, primarily for purely political reasons. This deepens disguised unemployment at the expense of reducing the phenomenon and wasting additional employment funds instead of investing them in the capacity of the productive base of the actual production sectors capable of providing accurate and abundant job opportunities.

5- They are increasing the output of young people from higher education institutions and the lack of alignment of many of their specializations with the requirements of the labour market, which contributed to deepening the unemployment of learners when they do not obtain a suitable job opportunity, or deepening underemployment when they accept a job opportunity that is not compatible with their specializations.

It is clear from Table 3 that the most significant gap between labour supply and demand in Iraq (2004-2020) was 26.8% in 2004. The reason is due to the increase in labour supply due to the dissolution of the previous army after 2003 and the abolition of the compulsory service law on the one hand. The demand for work declined as a result of the transitional conditions, economic reform, and the repercussions of the occupation on the other hand, while the unemployment rate decreased to about 18% in 2005, mainly as a result of changing the central question in the employment and unemployment survey by the standards of the International Labor Organization (ILO), as it classified the individual Those who worked for pay for one hour during the past week are among the employed, not the unemployed, and the unemployment rate continued to decline over the years (2006-2020) to reach 11.9 in 2012 due to the increase in employment in the government sector within the security, health, and educational forces as a result of the capacity of oil revenues on the one hand.

On the other hand, as the security situation remained stable, economic activity was stimulated, and the unemployment rate gradually increased between 2013 and 2015, reaching 22.7% in that year. This is linked to the rise in military spending to combat the war on gangs and the drop in oil earnings. In contrast, ISIS had a detrimental effect on economic reality and reduced the gap between the supply and demand of labour. Following emancipation, unemployment rates fell once more in 2016, 2017, and 2018, rising to 15.1%, 10.82%, and 10.9%, respectively, due to the recovery of revenues.

Oil prices rose, and the security situation stabilized. However, the popular needs that occurred in 2019 and the start of the coronavirus pandemic led to the unemployment rate rising to 22.6%, which soon declined to 13.7% in 2020 after the end of the protests. The increase in the government sector's absorption of surplus labour supply contributed to the rise in the financial burden on the general budget during the study period, as number of government workers and employees increased from 0.5 to approximately 3 million in 2003 and 2020, respectively (Faraj, 2022, p. 126), and to no avail. Economic, as non-oil revenues decreased at constant prices (2007 = 100) from approximately 14,144 to 9,751 million dinars, respectively (Hussein & Al-Haid, 2022, p. 241), that is, a decrease in the economic efficiency of each dinar of employment funds.

Table (3): Development of the Unemployment Rate Index in Iraq for the Period (2004-2020) (%).

the year	Unemployment rate	the year	Unemployment rate
2004	26.8	2013	16.0
2005	17.97	2014	20.0
2006	17.5	2015	22.7
2007	11.7	2016	15.1
2008	18.23	2017	10.82
2009	15.20	2018	11.9
2010	15.20	2019	22.6
2011	11.1	2020	13.7
2012	11.9		

Source: Dr Bedaa Abdul Razzaq Hussein and Dr Sajad Sadiq Al-Haid, (2022), The Impact of Fiscal Policy on Macroeconomic Variables in Iraq, a Standard Analytical Study for the period (2003-2020), Gulf Economic Journal, Issue 52 - June, University of Basra: Center for Basra and Arabian Gulf Studies, page 257.

Fourth: - Development of the Nominal Interest Rate Index (Policy Rate) in Iraq

The main challenge for the policy of the Central Bank of Iraq (the monetary authority) after it gained independence in 2004, is to curb inflation and stabilize the general level of prices, which it used indirect means to confront, including signals from the policy price and the exchange rate of the Iraqi dinar against the dollar, to move from investment from prepared assets. To speculate on investing in the assets of actual economic activity. From Table (4), it is possible to extrapolate the impact of the change in the policy rate by the Central Bank for the period (2004-2020) on the inflation rate index and the closeness of the policy rate to the real interest rate, as it is clear that monetary policy has adopted an expansionary trend for the policy rate gradually from 6.35% to 16.75. % in the years 2004 and 2009, respectively, which was reflected in the decline in the actual commodity interest rate for the period (2004-2008) and the move to a positive rate of 8.45% in 2009, which indicates the success of monetary policy in reducing the rise in the general level of prices from 29.9% in the year. 2004 to 8.3% in 2009, and this was done with the help of the decrease in the parallel exchange rate of the dinar from 1452 to 1182 against the dollar, respectively, and the provision of foreign balance to import Iraq's needs through the foreign currency sales window at the Central Bank.

After cancelling the negative margin in the real interest rate in 2009, monetary policy moved towards a contraction in the policy rate (2010-2020), as it decreased from 8.83% in 2010 to 4% in 2020. However, its impact on the inflation rate varies due to the positive and negative annual changes in the exchange rate. We find that the inflation rate decreased to 2.5% in 2010 as a result of the decrease in the policy rate at a growth rate of -47.3% despite the increase in the exchange rate at a growth rate of 0.3%, while the inflation rate rose to 5.1% in 2011 and then to 6.1% in 2012 due to the increase in the exchange rate growth to 0.8% and then to 1% despite the decrease in the policy rate to 6.25% and then to 6%, respectively. The years (2013-2020) witnessed a gradual decline in the policy rate from 6% to 4% for the years 2013 and 2020, respectively, and an approach to the real interest rate, which theoretically brings the incentives for both saving and investment closer to the reality of economic activity.

Table (4): Development of the Policy Price Index and the Real Interest Rate in Iraq for the Period (2004-2020) (%).

the year	Policy price (1)	Actual interest rate (2)	Fixed deposit interest rate for two (3) years	Interest rate on long-term lending (4)
2004	6.25	(23.55)	10	16.0
2005	5.60	(31.3)	9.1	13.5
2006	7.10	(46.10)	7.9	14.0
2007	7.12	(23.68)	8.08	15.13
2008	7.25	(5.45)	12.56	19.53
2009	16.75	8.45	13.11	19.57
2010	8.83	6.33	10.12	16.47
2011	6.25	0.65	8.18	14.35
2012	6	(0.1)	7.62	14.21
2013	6	4.1	7.87	13.74
2014	6	3.8	7.46	13.61
2015	6	4.6	6.59	13.10
2016	6	4.8	6.47	14.30
2017	4.14	3.94	6.65	14.03
2018	4	3.6	6.73	13.8
2019	4	4.2	6.87	15.2
2020	4	3.2	6.85	15.7

( ) between parentheses are negative values
Source: (1, 3, 4): General Directorate of Statistics and Research, Statistical Bulletin for the Years (2004-2020), Baghdad: Central Bank of Iraq.

(2) From the researchers' calculation of the real interest rate = policy rate - inflation rate.

Since 2004, the Central Bank of Iraq has adopted a decision to fully liberalize the market interest rate on deposits, loans and other financial instruments and to seek to activate and strengthen the role of the policy rate by market rules in a way that guarantees the equilibrium price, which narrows the gap between debit interest rates (all types of deposits). ACredit(all kinds of lending)is an ideal means to strengthen financial intermediation and increase competition within the banking system. They are among the fundamental pillars of financial stability (Central Bank of Iraq, 2003, 15), but in practice during the years (2004 - 2020). We notice the breadth of the gap between debit and credit interest rates in Iraq from Table (4), as it varied over the years of the study and increased in the general trend from 6% in 2004 to 8.85% in 2020.

The reason is increased commercial banks' hedging of systemic risks in the Iraqi financial markets. Despite the closeness of the policy rate to the real interest rate during the years (2017-2020), which indicates the weakness of the role of the decrease in the policy rate from 6.25% in 2004 to 4% in 2020 in harmonizing the civil and credit interest rates, and then indicating in saving and investment a decrease in return. The deposit compared to the cost of borrowing from the banking system, on the one hand, and the ineffectiveness of investing in commodity production sectors other than the oil sector due to the high cost of borrowing compared to the return achieved due to the continuation of commodity dumping on the other hand.

Fifth - The development of the indicator of the effectiveness of monetary and financial policies to achieve economic well-being in Iraq

It is possible to extrapolate the effectiveness of the monetary and fiscal policies in Iraq for the period (2004-2020) and achieve economic well-being according to the Steve Hank relationship, which includes subtracting the growth rate of actual per capita output from the sum of the rates of inflation, unemployment, and nominal interest (or policy rate) from Table (5), We note that the economic cost (policy price + inflation rate) gradually decreased from 36.25% in 2004 to 4.8% in 2020, which indicates an increase in the effectiveness of monetary policy in reducing the cost of achieving luxury, and its success in reducing the inflation rate index from 29.9% to 0.8%. Respectively, and through its indirect tools, the policy rate and the exchange rate of the dinar against the dollar, this was only achieved with the help of positive net foreign assets, coverage of the deficit in imported goods and service requirements, and a decrease in imported inflation. In contrast, monetary policy did not perform its desired role. The policy rate decreased during the period (2013-2020). Its closeness to the real interest rate improves the investment environment, except for the oil sector, due to the continued dependence of the most significant percentage of actual per capita output on oil revenues subject to external shocks.

Despite the increase in the number of workers in the government sector for mostly non-economic reasons and the increase in disguised unemployment at the expense of reducing apparent unemployment, the social cost (unemployment rate) still varies between increases. It decreased for the period (2004-2020) between 10.82% in 2017 and 22.7% in 2015, and its increase compared to the economically acceptable percentage ranges between 3% and 6%. This indicates the fluctuation in the disparity in obtaining a job opportunity among members of Iraqi society and the low economic efficiency of employment. The reason is attributed to the rentierism of the Iraqi economy on the one hand and the failure of the state to exploit the revenues. On the other hand, the oil sector is developing the real sectors of production that

provide many additional job opportunities, resulting in the low effectiveness of financial policy to achieve economic well-being.

Table (5): Evolution of the Effectiveness of Monetary and Fiscal Policies in Achieving Economic Prosperity in Iraq for the Period (2004-2020) (%).

the year	Effectiveness of monetary policy (1)	Effectiveness of fiscal policy (2)	Economic and social costs (1) +(2) = (3)	Per capita real output growth rate (4)	Degree of effectiveness/comfort (5)	Level of effectiveness/comfort (6)
2004	36.25	26.8	63.05	49.01	14.04	A
2005	42.50	17.97	60.47	(1.3)	61.77	D
2006	60.36	17.5	77.86	2.49	75.40	D
2007	37.92	11.7	49.62	(1.09)	50.71	D
2008	19.95	18.23	38.18	0.72	37.46	C
2009	25.55	15.2	40.75	4.13	36.62	C
2010	11.33	15.2	26.53	3.69	22.84	B
2011	11.85	11.1	22.95	4.81	18.14	A
2012	12.1	11..9	24.0	11.04	12.96	A
2013	7.9	16.0	23.9	4.91	18.99	A
2014	8.2	20.0	28.2	(5.55)	33.75	C
2015	7.4	22.7	30.1	10.73	19.37	A
2016	7.2	15.1	22.3	5.79	16.51	A
2017	4.54	10.82	15.36	(1.97)	17.33	A
2018	4.2	10.9	15.1	2.01	13.04	A
2019	3.8	22.6	26.4	4.16	22.24	B
2020	4.8	13.7	18.5	(17.99)	36.49	C

() between parentheses are negative values
Source: (1, 2, 4) from table (1, 3, 4).

(3) From the same Table.

(5) From the researchers' calculation according to Steve Hank's relationship.

(6) By classifying the four levels of well-being.

The effectiveness of monetary and fiscal policies is determined according to the Steve Hank relationship based on the economic feasibility of public service projects, as effectiveness increases with lower cost compared to the return (minimum possible loss). The researcher believes that it is possible to classify the level of effectiveness of monetary and fiscal policies according to the following: A is a high level of effectiveness of the score (0-20), B is a medium level of effectiveness of the score (more than 20-30), C is a low level of effectiveness of the score (more than 30-40). D Shallow level of effectiveness (more than 40). From Table (5), it is clear that the degree of effectiveness of monetary and fiscal policies in achieving economic well-being varies between 12.96% in 2012 and 75.4% in 2006 during the period (2004-2020), and the deterioration in effectiveness is concentrated in the years of the period (2005-2009) and the years 2014 and 2020. This was accompanied by a decline in actual output per capita growth in 2005, 2014, and 2020 due to decreased actual output compared to population growth, contrary to achieving the necessary conditions for economic well-being.

Conclusions and Recommendations

Conclusions

1- The inability of macroeconomic policy, particularly its monetary and financial tools, to increase the economic efficiency of productive activities other than the production of crude oil and to create a large number of real jobs, as well as the fact that the majority of the growth in actual per capita output—a prerequisite for economic well-being—continues to be dependent on changes in the price of crude oil on international markets.

2- Despite the failure of monetary policy to improve the growth of individual current output through the policy price, its performance increased in reducing inflationary pressures through its indirect tools, the policy price and the exchange rate of the Iraqi dinar, with the cheerful help of net foreign assets and their provision to fill the deficit in commodity supply through the selling window—currency, as well as low imported inflation.

3- Fiscal policy should be directed toward achieving distributive justice in income by encouraging disguised unemployment and taking on jobless people in the public sector to lower apparent unemployment. However, money meant for job creation should instead be directed toward diversifying the Iraqi economy and generating many well-paying jobs. Despite this, the economically acceptable rate calculates the unemployment percentage, which varies from high to low during the study period.

4- The degree of effectiveness of monetary and fiscal policy together in achieving economic well-being during the study period varies, and this is due to the unsustainability of the growth rate of actual per capita output, which is subject to fluctuations in oil revenues and the unemployment rate remaining high compared to the careful cost of the sum of the inflation rate and the price of the policy (policy effectiveness). Cash).

Recommendations

1- The necessity of focusing macroeconomic policy, through its monetary and financial tools, on reforming the structure of production because diversifying sources of output is a means to sustain the growth of actual individual production, fair distribution of real job opportunities, and economic well-being.

2- Sustain the independence of the Central Bank of Iraq and respond with balanced flexibility to curb inflation and encourage investment by integrating with financial policy tools.

3- The necessity of reforming the commercial banking system to supply the national economy with the funds necessary for its development and progress through financing viable, productive projects, which reflects positively on economic well-being in terms of growth of individual actual output and job creation, as well as developing the contribution of private activity in generating domestic product.

4- Examining the fiscal policy's top priorities, which include hiring unemployed people for government work and piling more debt on the general budget without raising non-oil revenue, and shifting the focus to the prosperity of economic activity by increasing government investment spending, particularly on idle projects, boosting the competitiveness of domestic goods, and igniting the private sector.

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